

REMARKS

Reconsideration of the subject patent application is respectfully requested.

Although the Examiner has issued a Final Office Action, the claims, as amended, are in condition for allowance. The Examiner will see that amendments to all independent claims are proposed that should help to clarify the structure and better distinguish the claimed structure from the cited Wood et al. reference. With regard to the current claim rejections, all of the claims are rejected under 35 U.S.C. §102(b) and/or under 35 U.S.C. §103(a) based upon the Wood et al. reference.

While Applicant has previously explained that the structure of Wood et al. is unclear at best, in terms of its “elasticated inserts 5a”, that explanation bears repeating here. As the Examiner is well aware, the entirety of the Wood et al. disclosure only mentions the “elasticated inserts 5a” once. While these inserts are believed to be added in order to help with a “close fit”, there is no mention of any sealing around the gas mask. These “elasticated inserts 5a” are never illustrated. Granted, there is the reference numeral 5a used in the drawing and a lead line drawn to a blank area, but that hardly provides any type of “teaching”. Considering the entirety of the Wood et al. reference, it is somewhere between extremely difficult and impossible to actually determine the specific structure of the “elasticated inserts 5a”, much less how they are inserted, how they function, and their composition.

We likely learn the most about these “inserts” from the choice of words used in the Wood et al. reference. The fact that these structures are identified as “inserts” indicates that they are positioned or inserted into some other structure, such as the

material surrounding the front hood opening. Consequently, while the opening may stretch a little due to these elasticated inserts, this does not make the overall opening a peripheral elastic hem, as recited in Applicant's claims. There is no provision for stretching by the base material where there are no inserts present. It is only the inserts which may be capable of stretching and consequently, all of the base fabric or material located between inserts does not have any elastic property. What Wood et al. provides by its inserts is considered to be an inferior design since the desired "close fit" is less likely where there is no elasticated insert and a "close fit" is not a sealed fit.

When the Examiner is forced to try and find a "plurality of peripheral sealing elements" in order to reject the claims, what are the options found in Wood et al?

Answer: None. There is nothing taught in Wood et al. that is equivalent to a "plurality of peripheral sealing elements". There is no mention anywhere in Wood et al. of any type of "sealing elements".

In order to make up this obvious deficiency, the Examiner has elected to once again use the "elasticated inserts 5a" as providing the recited peripheral sealing elements. There are though a couple of fairly significant deficiencies with regard to this selection. First of all, the elasticated inserts 5a are not peripheral. Additionally, the elasticated inserts 5a are not designed nor intended to provide sealing. The most that one might say about the elasticated inserts 5a of Wood et al. is that they are located in the area of the frontal hood opening. Applicant clearly recites an elastic hem as one claim element and peripheral sealing elements as a separate claim element (see FIG. 6). This understanding of separate claim elements is further supported by the text of independent claim 22 that

positions the plurality of peripheral sealing elements on the inner face of the peripheral elastic hem. This then means that the Examiner has to first take the elasticated inserts 5a and put them into the base material at selected points so as to try and provide a close fit. Thereafter, those same elasticated inserts 5a have to be positioned on themselves at a location which is neither illustrated nor described, namely an inner face, in order to provide peripheral sealing, a further characteristic and function that has no support in Wood et al. It is considered inappropriate for the Examiner to pick the same element out of a cited reference and use it for two different claimed elements where the claim clearly indicates and supports that these are separate and distinct elements. Consequently, it should be clear that Wood et al. is deficient in numerous ways.

Notwithstanding these important points, claim 22 recites that the plurality of sealing elements are conjoined to the inner face of the elastic hem. This specific structural combination is also referenced in independent claims 39 and 40. Accordingly, as explained above and considering the amendments to the claims, specification, and drawings, all pending claims are considered to be in condition for allowance.

While the foregoing explanation should be sufficient, there are further technical points to bring to the attention of the Examiner regarding the independent and dependent claims.

To begin, claim 22 further recites that the peripheral sealing elements are in the form of elastofibers, a structural characteristic that is completely absent in the Wood et al. disclosure. Wood et al. only discloses the use of elasticated inserts 5a that are understood to be inserted, in spaced apart locations, adjacent the edge of the facial aperture of the hood. The only way that one would be able to equate elasticated inserts with the specific

construction of using elastofibers is to rely on hindsight knowledge gained from an understanding of Applicant's pending application. Elastofibers have various technical properties that contribute to the sealing of the transition between the hood and the respirator. The construction of elastofibers provides a tight contact line around the respirator with sufficient contact pressure to be able to provide the desired sealing around the respirator. Wood et al. is completely silent with regard to any specific construction for its referenced elasticated inserts 5a.

Additionally, claim 22, for example, recites that the individual sealing elements are in a substantially parallel arrangement. Here again, there is nothing found in the Wood et al. reference that makes any suggestion about or reference to a substantially parallel arrangement of the (non-existent) sealing elements. One advantage of a parallel arrangement of the peripheral sealing elements is to provide a multiple "protective barrier wall" against the intrusion of poisonous substances. By having a parallel arrangement of the plurality of peripheral sealing elements, they act as multiple lines of defense, one after the other. Any suggestion by the Examiner that the elasticated inserts 5a of Wood et al. have or correspond to a parallel arrangement is considered to be total speculation. A parallel arrangement is neither disclosed nor rendered obvious by Wood et al. as that disclosure is completely silent. Based on the extraordinarily sparse disclosure of Wood et al. with regard to its elasticated inserts 5a, one could equally assume that the arrangement has a zig-zag form, or a wave-line form, or some other pattern other than parallel.

It is also worth noting that the Wood et al. disclosure makes reference to a "close fit" and this is not understood to be a sealed fit nor an "air tight fit". It is not uncommon in the clothing and garment world to refer to an article as having a close fit or snug fit to a

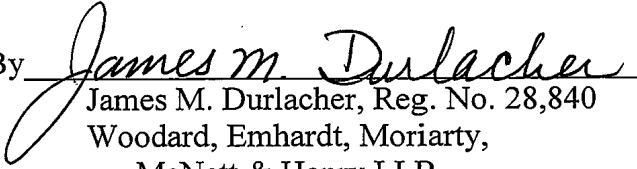
person's body. A close fit around the neck by a turtle neck shirt would be one example. Depending on how snug that fit might be, it would certainly be foreseeable that one might describe it as being a "close fit". However, that is clearly different from a sealed fit or an air tight fit that would essentially choke off the neck of the person wearing the turtle neck shirt. Essentially what Wood et al. is focusing on is some type of fixation fit in order to minimize any unwanted displacement of the hood in the worn state or condition. Further, the focus of Wood et al. is on a flow of air into and out of the garment and thus the desire to have filtering elements in those air flow paths.

With regard to some of the dependent claims, claim 25 provides a desired degree of protrusion of the sealing elements from the hem. This is important so that the sealing elements have sufficient size so as to be compressible for the desired sealing without being so large as to present other issues in terms of the overall design. This is expressed in a slightly different manner in dependent claim 31. In dependent claim 33, there is a limitation with regard to the relative elastic extensibility of the sealing elements. Here again, it has to be pointed out that this feature is beneficial in order to effect improved sealing since the contact pressure is further increased due to the resulting restoring force which occurs in the stretched state of the sealing elements. This is also important so that when the hood is slipped over the head, the face opening is then positioned over the respirator in the worn state and there needs to be sufficient flexibility in order to pass over the respirator structure. With regard to dependent claim 34, the specific modulus of elasticity is recited, once again providing the desired level or extent of stretching, noting that if it is too low, there would be a deteriorated sealing and if too high, would be difficult to fit onto the user and slip over the head and that protruding portion of the

respirator. These are all specific characteristics of the claimed invention that are without any support in Wood et al.

Considering the amending changes to the claims, specification and drawings, and considering the explanations and remarks set forth above, the subject application is considered to be in condition for allowance. However, if the Examiner is not convinced, then Applicant's undersigned attorney of record requests a telephonic interview prior to issuance of any Advisory Action. Perhaps there are still technical points with regard to the claimed invention and Wood et al. that need to be further explained if this Response is not sufficient. While every effort has been made to fully explain Applicant's position with regard to the Final rejections, the Examiner may still have further questions or perhaps claim questions or suggestions. Therefore, in order to try and move this application to issuance, a telephonic interview is requested.

Respectfully submitted,

By 
James M. Durlacher, Reg. No. 28,840
Woodard, Emhardt, Moriarty,
McNett & Henry LLP
111 Monument Circle, Suite 3700
Indianapolis, Indiana 46204-5137
(317) 634-3456